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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/649,954	08/29/2000	Norbert George Vogl	YOR920000534US1	9872

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EXAMINER

TIV, BACKHEAN

ART UNIT	PAPER NUMBER
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2151

DATE MAILED: 12/30/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application N .

09/649,954

Applicant(s)

VOGL ET AL.

Examiner

Backhean Tiv

Art Unit

2151

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 August 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-29 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 8/04.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

Detailed Action

This action is in response to the amendment filed on 8/2/04.

Claims 1-29 are pending in this application.

Information Disclosure Statement

The IDS filed on 8/2/04 has been considered.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 28 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 28 recites the limitation "the aggregate amount" . There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-11, 23, 26-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,240,460 issued to Mitsutake et al.(Mitsutake) in view of

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US Patent 5,890,134 issued to Fox in further view of US Patent 5,907,556 issued to Hisanaga et al.(Hisanaga).

As per claim 1,23,26,27 Mitsutake teaches a computer network dispatcher(figs.1-17) comprising:

one or more memories(col.10,lines 23-28);

one or more inputs for accessing one or more files from a database stored in the memory(col.1,lines 23-29,col.7,lines 16-21;it is inherent that there is a database stored in memory because data is being transmitted from one terminal to another);

one or more outputs to one or more respective network buffers(col.3,lines 30-34);

one of the transmission criteria being a quantity to transmit criteria defining a quantity of one or more of the portions of the respective file to transmit(col.10,line 37) and another of the transmission criteria being one or more release times being the time at which the respective portion is to be written to the network buffer(col.10,lines 30-41); a feedback using a quantity completion measure to estimate a completion time of the writing of the respective portion to the respective network buffer(col.20,lines 31-49);

a dispatching process that determines an available space on one or more of the network buffers and the dispatching process taking a minimum

value of the available space and the quantity of the respective portion, the dispatching process writing the minimum value of the respective portion of the one or more files to one or more of the network buffers(col.29,lines 1-18; by taking the average time of each page to be printed, the examiner interprets that this is the minimum value of available space on the network buffer and by scheduling the print-out order of the job on the printer as writing it to the network buffer);

one or more file lists, stored in one or more of the memories, identifying one or more of the files in the database that are to be transmitted over one or more networks connected to the respective network buffer(Fig.8,col.29,lines 1-18);

writing data to respective network buffers(col.29, lines 1-18).

However Mitsutake does not teach explicitly teach one or more schedulers that schedules one or more portions of one or more of the files define by transmission criteria about each of the files in the file list; the scheduler rescheduling one or more of the portions if one or more of the portions can not be scheduled to meet the respective transmission criteria; a current system time, determining if the system time is greater than or equal to one of the release times.

Fox teaches one or more schedulers that schedules one or more portions of one or more of the files define by transmission criteria about each of the files in the file list(col.3,lines 34-46); the scheduler rescheduling one or more of the portions if one or

more of the portions can not be scheduled to meet the respective transmission criteria(col.3,lines 34-46).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with certain criteria as taught by Mitsutake to add a scheduler to perform a task with as taught by Fox in order to improve data transmission by taking into account available resources(Fox, col.1,lines 4-9).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake and Fox in order to provide a system to improve data transmission(Fox, col.1, lines 4-9).

Mitsutake in view of Fox however does not teach a current system time, the dispatching process determining if the system time is greater than or equal to one of the release times.

Hisanaga teaches a current system time, determining if the system time is greater than or equal to one of the release times(col.5, line 65-col.6,line 3; examiner interprets the time for transmission as the system time and the time period as the release time).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with a scheduler for certain criteria as taught by Mitsutake in view of Fox to take into account system time as taught by Hisanaga in order to obtain high efficiency of use of transmission bandwidth(Hisanaga, col.4,lines 41-44).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake, Fox, and Hisanaga to provide a system to obtain high efficiency of data transmission(Hisanaga, col.4, lines 41-44).

As per claim 2, a dispatcher, as in claim 1, where the rescheduling changes the transmission criteria of one or more of the portions(Fox, col.3,lines 33-46). Motivation to combine set forth in claim 1.

As per claim 3, a dispatcher, as in claim 2, where the changes to the transmission criteria include any one or more of the following: changing one or more release times, changing one or more of the quantities, removing one or more of the transmission criteria, and adding one or more transmission criteria(Fox, col.3,lines 33-46). Motivation to combine set forth in claim 1.

As per claim 4, a network dispatcher, as in claim 1, where the available space is influenced by any one or more of the following: a network speed, a network bandwidth, a network congestion, a time of network availability, a duration of network availability, and a network use pricing(Mitsutake, col.1,lines 31-35).

As per claim 5, a network dispatcher, as in claim 1, where the transmission criteria further include any one or more of the following: a duration, a burst rate, and a burst size(Mitsutake, col.20,lines 40-49).

As per claim 6, a network dispatcher, as in claim 5, where duration establishes an end time beyond which no more of the portion is written to the network buffer(Mitsutake, col.20,lines 40-49).

As per claim 7, a network dispatcher, as in claim 5, wherein the transmission criteria comprises at least a burst size and a burst rate and where the portion of one or more files is partitioned into quantities of a size equal to the burst size and each quantity is written to the respective network buffer at a time interval equal to the burst rate(Hisanaga, col.9,lines 13-24;amount of data to be transmitted is interpret as the burst size and transmission rate as the burst rate). Motivation to combine set forth in claim 1.

As per claim 8, a network dispatcher, as in claim 1, where the file list further identifies one or more destination addresses of one or more recipients(Hisanaga, col.11,lines 17-20). Motivation to combine set forth in claim 1.

As per claim 9, a network dispatcher, as in claim 1, where the file list further identifies one or more transmission types defining how the portion is sent over the network(Mitsutake, col.4,lines 12-45).

As per claim 10, a network dispatcher, as in claim 9, where the transmission types include one or more of the following: unicast, multicast, broadcast, internet protocol (IP), IPX, asynchronous transfer mode (ATM), UDP, and TCP/IP(Mitsutake, col.4,lines 12-45).

As per claim 11, a network dispatcher, as in claim 1, where the quantity completion measure is any one or more of the following: an accumulated amount of one or more of the portions transmitted, and an amount of the portion transmitted(Mitsutake, col.29, lines 1-18).

As per claim 28, a dispatcher, as in claim 1, wherein the minimum value taken by the dispatching process corresponds to the quantity of network resources available less the aggregate amount of network use(Mitsutake, col.29, lines 1-19).

As per claim 29, a dispatcher, as in claim 1, wherein the transmission criteria further comprises at least a burst size(Hisanaga, col.9, lines 13-24; amount of data is interpreted as the burst size), and wherein the minimum value taken by the dispatching process corresponds to the burst size(Mitsutake, col.29,lines 1-19).Motivation to combine set forth in claim 1.

Claims 12-17,25 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,240,460 issued to Mitsutake et al.(Mitsutake) in view of US Patent 5,890,134 issued to Fox in further view of US Patent 5,907,556 issued to Hisanaga et al.(Hisanaga) in further view of US Patent 5,819,094 issued to Sato et al.(Sato).

Mitsutake in view of Fox in further view of Hisanaga teaches all the limitations of claim 1, however does not teach as per claim 12, a network dispatcher, as in claim 1, where a time stamp is stored with the quantity completion measure in a history log.

Sato teaches where a time stamp is stored with the quantity completion measure in a history log(col. 5,lines 55-67).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with a scheduler for certain criteria as taught by Mitsutake in view of Fox in further view of Hisanaga to add

where a time stamp is stored with the quantity completion measure in a history log as taught by Sato in order to log data collection and analysis(Sato, col.2,lines 15-16).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake, Fox, Hisanaga, and Sato in order to provide a system to collect and analyze data(Sato, col.2, lines 15-16).

As per claim 13, a network dispatcher, as in claim 12, where the quantity completion measure is one or more statistics of the history log(Mitsutake, col.20,lines 31-49 and Sato, col.2,lines 36-42).

As per claim 14, a network dispatcher, as in claim 13 when the statistics include any one or more of the following: an average amount written and a change in amount written(Sato, col.2,lines 43-46). Motivation to combine set forth in claim 12.

As per claim 15, a network dispatcher, as in claim 12, where one or more parts of the history log is recorded(Sato, col.2,lines 48-51). Motivation to combine set forth in claim 12.

As per claim 16, a network dispatcher, as in claim 1, where one or more errors are stored in a history log(Sato, col.9, lines 10-16). Motivation to combine set forth in claim 12.

As per claim 17, a network dispatcher, as in claim 16, where the errors include any one or more of the following: a disk error, a network error, a destination not found error, and a destination not responding error(Hisanaga, col.6,lines 20-25;examiner interprets the transmission error as a destination not found error). Motivation to combine set forth in claim 12.

As per claim 25, a method, as in claim 23, further comprising the step of time stamping one or more of the quantity completion measures(Sato, col.5,lines 55-61).
Motivation to combine set forth in claim 12.

Claims 18,19 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,240,460 issued to Mitsutake et al.(Mitsutake) in view of US Patent 5,890,134 issued to Fox in further view of US Patent 5,907,556 issued to Hisanaga et al.(Hisanaga) in further view of US Patent 6,502,062 issued to Acharya et al.(Acharya).

Mitsutake in view of Fox in further view of Hisanaga teaches all the limitations of claim 1, however does not teach as per claim 18, a network dispatcher, as in claim 1, further comprising a network use criteria table used by the scheduler to schedule the portions.

Acharya teaches a network use criteria table used by the scheduler to schedule the portions(Fig.6 and Fig.7).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with a scheduler for certain criteria as taught by Mitsutake in view of Fox in further view of Hisanaga to add a network use criteria table used by the scheduler to schedule the portions as taught by Acharya in order to improve scheduling methods that provide satisfactory performance(Acharya, col.2,lines 57-60).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake, Fox, Hisanaga, and Acharya to provide a method to improve scheduling methods(Acharya, col.2, lines 57-60).

As per claim 19, a network dispatcher, as in claim 1, further comprising a network use criteria table used by the dispatching process to take the minimum value of the available space, the quantity of the respective portion, and a remaining amount of defined network use(Acharya, Fig.6 and Fig.7). Motivation to combine set forth in claim 18.

Claims 20, 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,240,460 issued to Mitsutake et al.(Mitsutake) in view of US Patent 5,890,134 issued to Fox in further view of US Patent 5,907,556 issued to Hisanaga et al.(Hisanaga) in further view of US Patent 6,502,062 issued to Acharya et al.(Acharya) in further view of US Patent 5,819,094 issued to Sato et al.(Sato).

Mitsutake in view of Fox in further view of Hisanaga in further view of Acharya teaches all the limitation of claim 18 and an amount of network use field(Acharya, Fig.6 and Fig.7), however does not teach as per claim 20, a network dispatcher, as in claim 18, where the network use criteria table has a plurality of records, each record containing a time stamp field.

Sato teaches the network use criteria table has a plurality of records, each record containing a time stamp field(Fig.2,element 21).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with a scheduler for certain criteria as taught by Mitsutake in view of Fox in further view of Hisanaga in further view of Acharya to add the network use criteria table has a plurality of records, each record containing a time stamp field as taught by Sato in order to log data collection and analysis(Sato, col.2,lines 15-16).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake, Fox, Hisanaga, Acharya, and Sato in order to provide a system to collect and analyze data(Sato, col.2, lines 15-16).

As per claim 21, a network dispatcher, as in claim 20, where an aggregate of the amount of network use is recorded in a history log(Archarya, col.9,lines 40-59).Motivation to combine set forth in claim 18.

Claims 22, 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,240,460 issued to Mitsutake et al.(Mitsutake) in view of US Patent 5,890,134 issued to Fox in further view of US Patent 5,907,556 issued to Hisanaga et al.(Hisanaga) in further view of US Patent 5,581,369 issued to Righter et al.(Righter).

Mitsutake in view of Fox in further view of Hisanaga teaches all the limitations of claim 1, however does not teach as per claim 22, a network dispatcher, as in claim 1, further comprising a status indicator for sending one or more acknowledgments to one or more schedulers indicating one or more of the portions have been entirely transmitted over the network.

Richter teaches a status indicator for sending one or more acknowledgments to one or more schedulers indicating one or more of the portions have been entirely transmitted over the network(col.5,lines21-33).

Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to modify the system of transmitting data with a scheduler for certain criteria as taught by Mitsutake in view of Fox in further view of Hisanaga to add the idea of having a status indicator to inform a scheduler that data transmission is complete as taught by Richter in order to know when a data transmission is complete(Richter, col.5,lines 21-33).

One of ordinary skilled in the art at the time of the invention would have been motivated to combine Mitsutake, Fox, Hisanaga, and Richter to provide a system to determine when data transmission are completed(Richter, col.5, lines 21-33).

Claim 24 is rejected for the same reasons as claim 22.

Response to Arguments

The applicant has amended the claims to overcome the claim objection therefore the examiner withdraws the claim objections as per claim 1-2,7,18,22-23,26-27.

Applicant's arguments filed 8/2/04 have been fully considered but they are not persuasive.

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention

where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, there are motivation to combine Mitsutake, Fox, and Hisanaga which is suggested by Fox and Hisanaga.

In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

In response to applicant's argument that Fox is nonanalogous art, it has been held that a prior art reference must either be in the field of applicant's endeavor or, if not, then be reasonably pertinent to the particular problem with which the applicant was concerned, in order to be relied upon as a basis for rejection of the claimed invention. See *In re Oetiker*, 977 F.2d 1443, 24 USPQ2d 1443 (Fed. Cir. 1992). In this case, Fox is analogous art because Fox teaches optimizing the performance schedule of multiple task necessary to accomplish a project which can be applied to Mitsutake.

The applicant argues that Mitsutake reference discusses the scheduling of print jobs and that it does not teach the dispatching process. As define by *The American Heritage College dictionary*, dispatching is to relegate to a specific destination or send to a specific business. Mitsutake teaches scheduling the print-out order among print jobs and the image processing order of pages in a single print job. Mitsutake does teach by definition a dispatching process.

The applicant argues that Fox does not teach certain limitations of claim 1. Fox teaches the scheduling of tasks with certain criteria. This teaching can be applied to Mitsutake to teach the limitations of claim 1. Mitsutake in view of Fox in further view of Hisanaga teaches all the limitations of claim 1.

The applicant argues that Hisanaga does not teach a system time to be used in a dispatching process. Mitsutake teaches the dispatching process. Hisanaga is used to teach the system time.

Applicant argues that since claim 1 is patentable over the references on record that claims 2,3,9,23, 26-27 are also patentable. However, claim 1 is not patentable over the references on record. therefore claims 2,3,9,23, 26-27 are also not patentable

Applicant argues as per claim 8, that Hisanaga does not teach, "file list further identifies one or more destination addresses of one or more recipients". The examiner disagrees, Hisanaga teaches the sending of data from a sending unit to a receiving unit(Fig.1-3, Abstract). It is implicit there are destination addresses(e.g.data receiving unit) in order for the data sending unit to know where to send data.

Applicant argues as per claim 12 that Sato does not teach, "the quantity completion measure is on one or more statistics of the history log". Sato does teach the limitation as per claim 12, see col.5, lines 55-67.

Applicant argues as per claim 13, that Sato does not teach a data transmission process. This claim limitation is not claimed in claim 13.

Applicant argues as per claim 14,15 that Sato does not teach a network dispatcher. The Sato is not relied upon to teach a network dispatcher, Mitsutake teaches this limitation in claim 1.

Applicant argues as per claim 16 that Sato does not teach logging of errors. Examiner does not agree, Sato does teach logging errors, col.9, lines 6-12.

Applicant argues as per claim 17, that Hisanaga does not teach logging of transmission errors. This claim limitation is not claimed in claim 17. Sato does teach logging errors, col.6, lines 20-28).

As per claim 25, Sato does teach the limitation of claim 25, col.5, lines 55-61.

Applicant argues as per claim 18, 19 that Acharya does not the limitation of claim 18, Acharya does read onto claim 18, Fig.6 and 7.

As per claim 20,21, Applicant argues on the same basis as claim 18,19,12-17,25 see above for arguments.

In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., scheduler refers to computer apparatus and not a human user) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification,

limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. See PTO-892.

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Backhean Tiv whose telephone number is (571)272-3941. The examiner can normally be reached on 9 A.M.-12 P.M. and 1 -6 P.M. Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Zarni Maung can be reached on (571) 272-3939. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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12/16/04


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